# CONTENTS

## SECTION B—VOL LXIX

### No. 1—January 1969


PAGE

**Some New Interstitial Copepods from Waltair Coast** . . . . . G. Chandrasekhara Rao and P. N. Ganapati 1

**Allanite from Apatite Veins Near Kasipatnam, Visakhapatnam District, Andhra Pradesh** . . . A. T. Rao, K. S. R. Rao and A. Sriramadas 15

**Neurosecretion in the Central Nervous System of the Hermit Crab, *Diogenes bicristimanus*** . . . . . R. Nagabhushanam and R. Sarojini 20

**Differential Blood Cell Counts of Four Species of Freshwater Air-breathing Fishes** . . . . . Saghir H. Khan and A. Qayyum (Siddiqui) 29

**Auxin-induced Biochemical Changes in Isolated Leaves. I. Changes in the Leaves of *Vinca rosea* L. on Treatment with Indole-3-butyric Acid** . . . . . G. Misra and B. Jema 36

**The Percentage Evaluation of "Drumsticks" in the Lenkocytes of Peripheral Blood in Clinically Normal Males at Different Age Groups 0-60 Years** . . . . . V. C. Anguli, M. Dharmarajan and M. A. Mythili 42


### No. 2—February 1969


**Organic Production in a Tropical Estuary** . . . . . S. Z. Qasim, S. Wellershaus, P. M. A. Bhattathiri and S. A. H. Abidi 51


### No. 3—March 1969


**Physiology and Plant Pathology** . . . . . T. S. Sadasivan 95

**Physiology of Virus-infected Plants** . . . . . K. Ramakrishnan, K. K. N. Nambiar and M. N. Alagianagalingam 104

**Trace Metals in Plant Diseases** . . . . . A. Apparao 115

No. 3—March 1969 (*Contd.*)

PAG

Physiology of Disease Resistance in Sugarcane with Particular Reference to Red Rot . . . . . K. V. Srinivasan 120

Enzymes in Pathogenesis . . . . . D. Subramanian 133

Respiration under Pathogenesis . . . . . R. N. Swamy 142

Stress Physiology in Plant Bacterial Diseases . . . . . M. V. Nayudu 146

Applications of Plant Tissue and Cell Culture in the Study of Physiology of Parasitism . . . . . Ramesh Maheshwari 152

Tracer Techniques in Plant Pathology . . . . . S. Suryanarayanan 173

Immunoserology in the Study of Plant Pathogens . . R. Kalyanasundaram 181

No. 4—April 1969

Floral Colours and Their Origins . . . . . Sir C. V. Raman 185

The Prothallus of *Polystichum* . . . . . B. K. Nayar, Surjit Kaur and Prakash Chandra 198

On a New Trematode *Diplodiscus chauhani* N. Sp. from the Common Indian Frog, *Rana cyanophlyctis* Schneider . . . . . K. C. Pandey 203

Note on Fungi of Jammu and Kashmir—II . . . . . V. R. Pandotra and K. S. M. Sastry 207

Calc-Silicate Rocks and Charnockites from Kasimkota Area, Visakhapatnam District, A.P. . . . . A. V. R. Sastry and R. S. N. Murty 213

A Collection of Brachionid Rotifers from Kerala . . . . . C. K. G. Nayar and K. K. N. Nair 223

No. 5—May 1969

Carbonic Anhydrase Activity in the Gills of *Etroplus maculatus* (Teleostei) as a Function of Salinity Acclimation . . . . . R. V. Krishnamoorthy and V. Virabhadrachari 235

Shoot Apical Organisation and Development of Leaf and Axillary Bud in *Capparis decidua* Pax . . . . . M. L. Trivedi 241

No. 5—May 1969 (*Contd.*)

PAGE

Studies of Some Rare Spiders of the Families Selenopidae and Platoridae from India . . . . . B. K. Tikader 252

A New Species of *Sonerila* Roxb. (Melastomataceae) from South India . . . . . M. P. Nayar 256

Studies on the Cephalochordates of Madras Coast. V. The Effect of the Concentration of Particulate Matter and the Oxygen Tension in Sea-Water on the Filtration Rates of Amphioxus *Branchiostoma lanceolatum* . . . . . Jayapaul Azariah 259

On Two New Nematodes of the Genus *Abbreviata* Travassos, 1920, along with a Redescription of Third, *Abbreviata achari* (Mirza, 1935) . . . . . T. D. Soota and Y. Chaturvedi 269

Some Observations on the Structure and Life-History of *Cercaria andhraensis* N.Sp. (Trematoda: Echinostomatidae) from the Apple Snail *Pila globosa* Swainson of Waltair . . . . P. N. Ganapati and K. Hanumantha Rao 277

The Myxomycetes of India—XXIII . . . K. S. Thind and H. S. Khara 284

No. 6—June 1969

The Fungicide Kitazin and the Mycoflora of Rice . . Shanker Bhat Sullia 295

Granophyre Dykes from Hunsur Area, Mysore District, Mysore State . . . . . M. G. Tadkod and M. S. Sadashivaiah 309

Evolution of New Races of Univoltine Silkworm by Physiological Genetics . . . . . E. S. Narayanan and B. L. Tikoo 320

Tidal Cycle and the Environmental Features of Cochin Backwater (A Tropical Estuary) . . . . . S. Z. Qasim and C. K. Gopinathan 336